

PISC Time Period Years	4				
Testing and Monitoring Cost					
	Ground Water Sampling	Ground Water Report Generation	Deep Well Sampling Oversight & Report	Deep Well Sample Collection	Wire Line Logs
Professional Fees	\$ 2,725	\$ 3,730	\$ 11,120	\$ 40,000	\$ 50,000
KEI Equipment & Expenses	\$ 2,171	\$ 75	\$ 2,438		
Laboratory Fees	\$ 4,642		\$ 3,174		
Waste Disposal	\$ 173				
Workover Rig Mobilization					\$ 80,000
Cost Per Event	\$ 9,711	\$ 3,805	\$ 16,732	\$ 40,000	\$ 130,000

Annual Testing & Monitoring Cost		Number Events/Yr	Cost/Year
Ground Water Sample 1 Event	\$ 13,516	2	\$ 27,032
Deep Well Sample 1 Event	\$ 56,732	1	\$ 56,732
Wire Ling Logs	\$ 130,000	1	\$ 130,000
Total Cost/Yr			\$ 213,764
Cost for PISC period			\$ 855,056
Periodic Testing		Number Events/PISC	Cost
Seismic Evaluation 4 sq mile area			\$ 479,436
Plume Area Seismic Cost		1	\$ 958,872
Total PISC T&M Costs			\$ 1,813,928

Injection Well Plugging		
Plug #	Item	Cost per well
1-3	Schlumberger CO2 Resistant Concrete (includes pumping) (2 Days)	\$ 351,010
4-9	Class H Cement Plug (includes pumping) (1 day)	\$ 32,427
	Workover rig mob	\$ 10,000
	Rig time 7 days/3,500 per day	\$ 24,500
	BOP	\$ 2,000
	Work String	\$ 7,000
	Power Tongs	\$ 5,000
	De Mob rig	\$ 10,000
	Total Cost	\$ 441,937
	Total Cost (2 injection)	\$ 883,874

Total Financial Responsibility Costs	
Injection Well Plugging	\$ 883,874
PISC and Site Closure	
Monitor Well Plugging	\$ 1,051,728
Site Remediation	\$ 777,000
PISC Testing & Monitoring	\$ 1,813,928
Total Cost	\$ 3,642,656
Emergency and Remedial Response	\$ 9,378,796
Total Cost	\$ 13,905,326

Well Site Remediation	
Item	Cost per Pad
Removal of pad material, replacment with topsoil and final grading	\$ 129,500

Confinement Monitoring Well Plugging	
Item	Cost
Class H Cement Plug (inlcudes pumping) (1 day)	\$ 32,427
Workover rig mob	\$ 10,000
Rig time 5 days/3,500 per day	\$ 17,500
BOP	\$ 2,000
Work String	\$ 7,000
Power Tongs	\$ 5,000
De Mob rig	\$ 10,000
Total Cost	\$ 83,927
Total Cost (2 Wells)	\$ 167,854

Formation Monitoring Well Plugging		
Plug #	Item	Cost per well
1-3	Schlumberger CO2 Resistant Concrete (includes pumping) (2 Days)	\$ 351,010
4-9	Class H Cement Plug (includes pumping) (1 day)	\$ 32,427
	Workover rig mob	\$ 10,000
	Rig time 7 days/3,500 per day	\$ 24,500
	BOP	\$ 2,000
	Work String	\$ 7,000
	Power Tongs	\$ 5,000
	De Mob rig	\$ 10,000
	Total Cost	\$ 441,937
	Total Cost (2 Wells)	\$ 883,874

USDW Remediation Cost Estimate		
Item	Cost	Note
Planning and Permitting	\$ 798,000	
Leak Investigation / Hydrogeological Study	\$ 1,994,200	10 wells install and Sample
Well Installation & Modifications	\$ 1,126,025	4 extraction wells install, injection well convert
Extraction Pumps - 10 GPM/well, 2400 Ft, 40 GPM total	\$ 819,700	4 Ext. pumps install and electric service
Injection Water Source	\$ 307,200	4 water wells w/ pumps; inj. Pump and electric service
Extraction Fluid Treatment (40 GPM, Adsorption - 2 yrs	\$ 245,970	Treatment system & media change outs
Site Improvement - Office / Treatment Buildings	\$ 774,850	Elec Svc, treatment trailer, office trailer, fencing
Excavation Work - Remediation System Install	\$ 131,560	Trenching to wells for water and elec. Piping
Operations, Maintenance, Monitoring of Remed. System	\$ 1,353,158	2.25 Yrs O&M
System Decommissioning - Site Restoration	\$ 265,000	Removal
Total	\$ 7,815,663	
20% Contingency	\$ 9,378,796	